IN THE CLAIMS:

- 1. (Currently Amended) A method of regenerating an immunosensor comprising the step of applying at least one electrical pulse to a bound antibody-antigen complex of an immunosensor whereby the complex debinds responsive to the at least one pulse.
- 2. (Original) The method of claim 1, wherein the immunosensor further comprises a flexural plate wave sensor.
- 3. (Currently Amended) An electrophoretic manipulator A system for the regeneration of an immunosensor, the system comprising:

an immunosensor having at least one bound antibody-antigen complex on a surface of the immunosensor;

an the electrophoretic manipulator comprising an electrical pulse applicator, the electrophoretic manipulator adapted to positioned to apply at least one electrical pulse to the surface of an the immunosensor having a bound antibody antigen complex whereby the complex debinds responsive to the at least one pulse.

- 4. (Currently Amended) The electrophoretic manipulator system of claim 3, further comprising wireless remote monitoring.
- 5. (Currently Amended) The electropheretic manipulator system of claim 3, wherein the immunosensor further comprises a flexural plate wave sensor.